UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/843,036	04/25/2001	Matthew Frank Trapani	00-625-B	7211

7590 08/17/2006	EXAMINER
George I. Lee	TRAN, QUOC A

George I. Lee
McDonnell Boehnen Hulbert & Berghoff
32nd Floor
300 S. Wacker Drive
Chicago, IL 60606

ART UNIT	PAPER NUMBER
2176	

DATE MAILED: 08/17/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

PTO-90C (Rev. 10/03)

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE _3_ MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☐ Responsive to communication(s) filed on _5/15/2006_.

2a)☒ This action is **FINAL**.   2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☐ Claim(s) _1-35 and 37-43_ is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☐ Claim(s) _1-35 and 37-43_ is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☐ All b)☐ Some * c)☐ None of:

      1.☐ Certified copies of the priority documents have been received.

      2.☐ Certified copies of the priority documents have been received in Application No. _____.

      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)	4) ☐ Interview Summary (PTO-413)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s)/Mail Date. _____ .
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)	5) ☐ Notice of Informal Patent Application (PTO-152)
Paper No(s)/Mail Date _____ .	6) ☐ Other: _____ .

DETAILED ACTION

1.   This action is responsive to amendment filed on 5/15/2006 (original filling date of

5/20/2002 which claims benefit of 60/199,858 filed 04/26/2000).

2.   Claims 1-35 and 37-43 are currently pending in this application. Applicant canceled

claim 36, amended independent claims 1, 16, 20, 23, 27, 31, 39 and dependent claim 34 Claims

1, 16, 20, 23, 27, 31 and 39 are independent claims.

3.   The Examiner withdrawn 35 U S.C. 101 rejections to claims 1-26, and 31-35 and 37-43.

Claim Objections

4.   Claim 34 objected to because of the following informalities: Claim 34 identifier status as

(original) rather than (currently amended), for the examining purpose the Examine assumes this

is a typo error (see Amendments To The Claims page 10). Appropriate correction is required.

Claim Rejections - 35 USC § 103

5.   The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all
obviousness rejections set forth in this Office action:

*(a) A patent may not be obtained though the invention is not identically disclosed or described as set
forth in section 102 of this title, if the differences between the subject matter sought to be patented and
the prior art are such that the subject matter as a whole would have been obvious at the time the
invention was made to a person having ordinary skill in the art to which said subject matter pertains.
Patentability shall not be negatived by the manner in which the invention was made.*

Independent claims 1-35 and 37-43 are rejected under 35 U.S.C. 103(a) as being

unpatentable by Bickmore et al. "Web Page Filtering and Re-Authoring for Mobile Users"

Published 1999 by The Computer Journal, (hereinafter Bickmore), further view of Hirose et al.

US006973619B1 filed- 06/30/1999 (hereinafter Hirose).

In regard to independent claim 1, a template normalizer for matching and applying a template to the information content, (as taught by Bickmore at pages 534-546, also see Fig. 1, disclosed the Digestor system automatically converts web-based documents designed for desktop viewing into formats appropriate for handheld devices with small display screens, such as Palm-PCs, PDAs, and cellular phones. Digestor can also be instructed, via a scripting language, to render portions of documents. For example the CSS, a single style sheet defines a set of display attributes for different structural portions of a document (e.g. all top-level section headings are to be displayed in red 18- point Times font). A series of style sheets may be attached to a document, each with a weight describing its desirability to the document's author. The user can also specify a style sheet, as can the WWW browser using the 'default' style sheet. Although the author's style sheets normally override the user's, the user can selectively enable or disable the author's, providing them with the ability to tailor the rendering of the document to their particular display),

Examiner read the above in the broadest reasonable interpretation to the claim limitation, wherein a template normalizer would have been an obvious variant of the Digestor system automatically converts web-based documents designed for desktop viewing into formats appropriate for handheld devices with small display screens, such as Palm-PCs, PDAs, and cellular phones. Digestor can also be instructed, via a scripting language, to render portions of documents, wherein single style sheet defines a set of display attributes for different structural portions of a document, to a person of ordinary skill in the art at the time the invention was made.

wherein the template defines modifications to the document in order to adapt the

document for display on a device other than an originally intended device (as taught by

Bickmore at pages 534-546, also see Fig. 1, disclosed the Digestor system automatically

converts web-based documents designed for desktop viewing into formats appropriate for

handheld devices with small display screens, such as Palm-PCs, PDAs, and cellular phone),

an automatic normalizer for folderizing the information content, (as taught by

Bickmore at pages 534-546, also see Fig. 1, disclosed the Digestor system automatically converts

web-based documents designed for desktop viewing into formats appropriate for handheld

devices with small display screens, such as Palm-PCs, PDAs, and cellular phones. Digestor can

also be instructed, via a scripting language, to render portions of documents, processing

information from arbitrary web-based documents from any location reachable by wired or

unwired communication. Digestor employs a heuristic planning algorithm and a set of structural

page transformations to produce the 'best' looking document for a given display size. Digestor

can also be instructed, via a scripting language, to render portions of documents, For example the

CSS, a single style sheet defines a set of display attributes for different structural portions of a

document (e.g. all top-level section headings are to be displayed in red 18- point Times font). A

series of style sheets may be attached to a document, each with a weight describing its

desirability to the document's author. The user can also specify a style sheet, as can the WWW

browser using the 'default' style sheet. Although the author's style sheets normally override the

user's, the user can selectively enable or disable the author's, providing them with the ability to

tailor the rendering of the document to their particular display),

Examiner read the above in the broadest reasonable interpretation to the claim limitation, wherein a template normalizer and folderizing would have been an obvious variant of the Digestor system automatically converts web-based documents designed for desktop viewing into formats appropriate for handheld devices with small display screens, such as Palm-PCs, PDAs, and cellular phones, wherein single style sheet defines a set of display attributes for different structural portions of a document, to a person of ordinary skill in the art at the time the invention was made.

wherein the a template normalizer attempts to match a template to the information content, and if not the automatic normalizer for folderizing the information content to produce a normalized information content, (as taught by Bickmore at pages 534-546, also see Fig. 1, disclosed the Digestor system automatically converts web-based documents designed for desktop viewing into formats appropriate for handheld devices with small display screens, such as Palm-PCs, PDAs, and cellular phones. Digestor can also be instructed, via a scripting language, to render portions of documents, processing information from arbitrary web-based documents from any location reachable by wired or unwired communication. For example the CSS, a single style sheet defines a set of display attributes for different structural portions of a document (e.g. all top-level section headings are to be displayed in red 18- point Times font). A series of style sheets may be attached to a document, each with a weight describing its desirability to the document's author. The user can also specify a style sheet, as can the WWW browser using the 'default' style sheet. Although the author's style sheets normally override the user's, the user can selectively enable or disable the author's, providing them with the ability to tailor the rendering of the document to their particular display),

Examiner read the above in the broadest reasonable interpretation to the claim

limitation, wherein a template normalizer would have been an obvious variant of the Digestor

system automatically converts web-based documents designed for desktop viewing into formats

appropriate for handheld devices with small display screens, such as Palm-PCs, PDAs, and

cellular phones, wherein single style sheet defines a set of display attributes for different

structural portions of a document, to a person of ordinary skill in the art at the time the
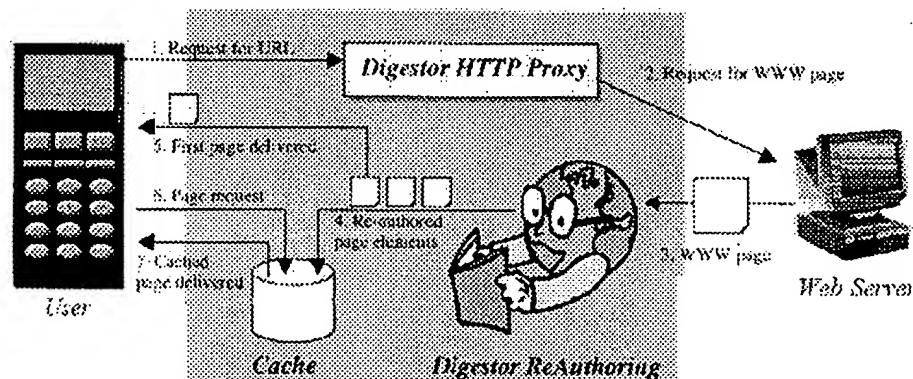
invention was made.

FIGURE 1. Document flow in Digestor between the user and server.

wherein the information content is organized into a set of hierarchical nodes having

respective weights, (Bickmore at pages 534--546, "Automated re-authoring system", also see

Fig. 4, 7 and 8, discloses an automated re-authoring system that implements the re-authoring

engine that uses heuristics to generate pages customized for the specific device upon which they

will be displayed. Individual page transformations are ordered by their desirability. In order to

determine which combination of transformations should be applied to a given document Digestor

performs a depth-first search of the document transformation space, using many heuristics that

describe preconditions for transformations and combinations of transformations; For example the

method of "First sentence elision transform", Since most pages have text blocks, even when no

section headers are present, first sentence elision can be a good way of reducing the required

screen area. In this technique, each text block is replaced with its first sentence (or phrase up to

some natural break point), and this sentence is also made into a hypertext link to the original text

block. Also provides the CSS, a single style sheet defines a set of display attributes for different

structural portions of a document (e.g. all top-level section headings are to be displayed in red

18- point Times font). A series of style sheets may be attached to a document, each with a weight

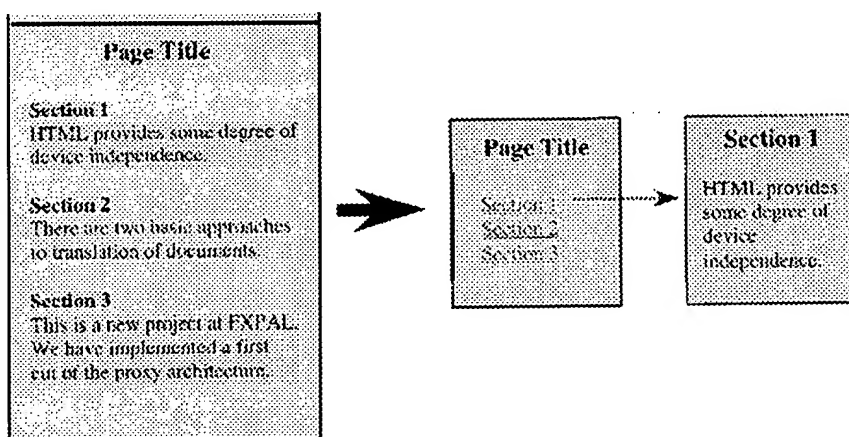describing its desirability to the document's author
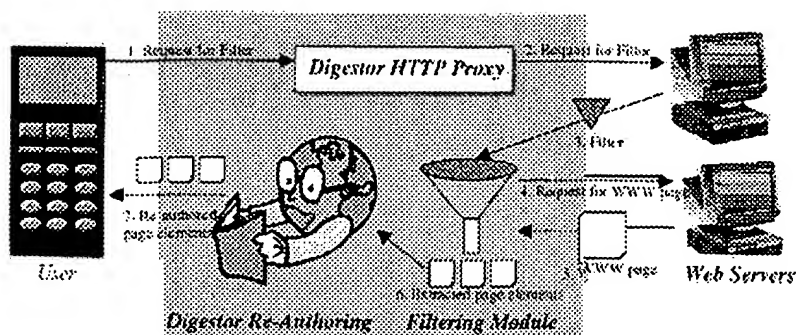

FIGURE 4. Section outlining transform.

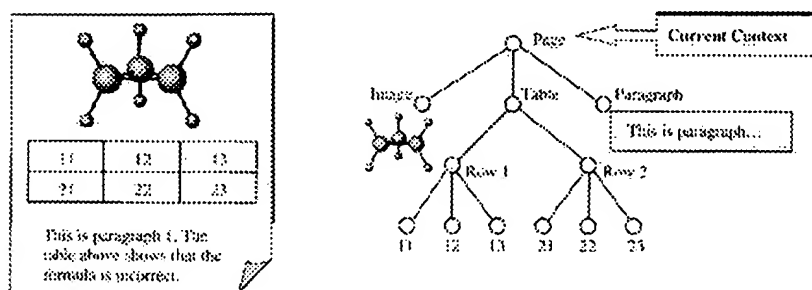FIGURE 7. Example of dataflow in the document filtering module.

FIGURE 8. Example WWW page and corresponding AST. The current context is set to root of the AST

Examiner read the above in the broadest reasonable interpretation to the claim limitation, wherein hierarchical nodes having respective weights, would have been an obvious variant of the re-authoring engine that uses heuristics to generate pages customized for the specific device upon which they will be displayed (e.g. A series of style sheets may be attached to a document, each with a weight describing its desirability) using the Depth-first search (DFS) to a person of ordinary skill in the art at the time the invention was made . As illustrated in the above Fig. 4, 7-8, a depth first search, which would have been obvious to a person of ordinary skill in the art at the time the invention was made to appreciated that Depth-first search (DFS) is an algorithm for traversing or searching a tree, tree structure, or graph. Intuitively, you start at the root (selecting some node as the root in the graph case) and explore as far as possible along each branch.

Bickmore does not explicitly teach, **where a weight determines whether a node will be inserted into a normalized document as a folder title or folder contents,** however (Hirose at col. 3 line 20 through col. 4, line 55, discloses a method for generating display control information (HTML document, for instance) so as to display in a form adapted to a terminal used by a user, such as a group of data objects are generated independently of any terminal, even if a new terminal comes to output a display request, part which generates the group of data object does not need to be changed (the terminals are equipments such as ordinary PCs, PDAs, TV sets and cellular phones on which a browser is available), wherein generating a group of view objects may also comprise the steps of: generating a root object of the group of view objects; and having child objects generated by the root object. The root object may also have a method for generating child objects by referring to information about the attributes of the terminal. These child objects generate grandchild objects as required and the instruction information includes priorities of objects, information of whether or not splitting is possible, and information of whether or not outlining is possible, etc. In addition, information about the attributes of the terminal includes the screen size of the terminal, communication speed, aspect ratio, and number of colors. Moreover, although display control information in the embodiments is in Hyper Text Markup Language (HTML), it may be in any other markup language),

Examiner read the above in the broadest reasonable interpretation to the claim limitation, wherein a weight determines whether a node will be inserted into a normalized document as a folder title or folder contents, would have been an obvious variant of child objects generate grandchild objects as required and the instruction information includes priorities of objects,

information of whether or not splitting is possible, and information of whether or not outlining is

possible, etc. In addition, information about the attributes of the terminal includes the screen size

of the terminal, communication speed, aspect ratio, and number of colors to a person of ordinary

skill in the art at the time the invention was made.

wherein the automatic normalizer folderizes the information content by

identifying content having a higher visibly on a display of the originally intended device,

however (Hirose at col. 3 line 20 through col. 4, line 55, discloses a method for generating

display control information (HTML document, for instance) so as to display in a form adapted

to a terminal used by a user, such as a group of data objects are generated independently of any

terminal, even if a new terminal comes to output a display request, part which generates the

group of data object does not need to be changed (the terminals are equipments such as

ordinary PCs, PDAs, TV sets and cellular phones on which a browser is available), wherein

generating a group of view objects may also comprise the steps of: generating a root object of

the group of view objects; and having child objects generated by the root object. The root

object may also have a method for generating child objects by referring to information about

the attributes of the terminal. These child objects generate grandchild objects as required and

the instruction information includes priorities of objects, information of whether or not splitting

is possible, and information of whether or not outlining is possible, etc. In addition, information

about the attributes of the terminal includes the screen size of the terminal, communication

speed, aspect ratio, and number of colors. Moreover, although display control information in

the embodiments is in Hyper Text Markup Language (HTML), it may be in any other markup

language),

Examiner read the above in the broadest reasonable interpretation to the claim limitation,

wherein identifying content having a higher visibly, would have been an obvious variant of child

objects generate grandchild objects as required and the instruction information includes priorities

of objects, information of whether or not splitting is possible, and information of whether or not

outlining is possible, etc. In addition, information about the attributes of the terminal includes the

screen size of the terminal, communication speed, aspect ratio, and number of colors to a person

of ordinary skill in the art at the time the invention was made.

assigning the content having the higher visibility a weight indicative of a folder

title, however (Hirose at col. 3 line 20 through col. 4, line 55, discloses a method for generating

display control information (HTML document, for instance) so as to display in a form adapted

to a terminal used by a user, such as a group of data objects are generated independently of any

terminal, even if a new terminal comes to output a display request, part which generates the

group of data object does not need to be changed (the terminals are equipments such as

ordinary PCs, PDAs, TV sets and cellular phones on which a browser is available), wherein

generating a group of view objects may also comprise the steps of: generating a root object of

the group of view objects; and having child objects generated by the root object. The root

object may also have a method for generating child objects by referring to information about

the attributes of the terminal. These child objects generate grandchild objects as required and

the instruction information includes priorities of objects, information of whether or not splitting

is possible, and information of whether or not outlining is possible, etc. In addition, information

about the attributes of the terminal includes the screen size of the terminal, communication

speed, aspect ratio, and number of colors. Moreover, although display control information in

the embodiments is in Hyper Text Markup Language (HTML), it may be in any other markup

language),

Examiner read the above in the broadest reasonable interpretation to the claim limitation,

wherein identifying content having a higher visibly, would have been an obvious variant of child

objects generate grandchild objects as required and the instruction information includes priorities

of objects, information of whether or not splitting is possible, and information of whether or not

outlining is possible, etc. In addition, information about the attributes of the terminal includes the

screen size of the terminal, communication speed, aspect ratio, and number of colors to a person

of ordinary skill in the art at the time the invention was made.

It would have been obvious to a person of ordinary skill in the art at the time the

invention was made to have modified the teaching of Bickmore, discloses a template normalizer

for matching and applying a template to the information content, wherein the template defines

modifications to the document in order to adapt the document for display on a device other than

an originally intended device an automatic normalizer for folderizing the information content,

wherein the a template normalizer attempts to match a template to the information content, and if

not the automatic normalizer for folderizing the information content to produce a normalized

information content, wherein the information content is organized into a set of hierarchical nodes

having respective weights, to include a means of determinates where a weight determines

whether a node will be inserted into a normalized document as a folder title or folder contents,

wherein the automatic normalizer folderizes the information content by identifying content

having a higher visibly on a display of the originally intended device, assigning the content

having the higher visibility a weight indicative of a folder title of Hirose's teaching. One of

ordinary skill in the art would have been motivated to perform such a modification to provides an

automatic re-authoring of web documents to make them automatically converts web-based

documents designed for desktop viewing into formats appropriate for handheld devices with

small display screens, such as Palm-PCs, PDAs, and cellular phones (as taught by Bickmore at

page 534).

In regard to independent claim 16, incorporate substantially similar subject matter as

cited in claim 1 above, and in further view of the following, and is similarly rejected along the

same rationale,

wherein if a node has no effect on a visual display of the information content and the

node is not folder content, the node is removed, (Bickmore at pages 534--546, "Automated re-

authoring system", also see Fig. 4, 7 and 8, discloses an automated re-authoring system that

implements the re-authoring engine that uses heuristics to generate pages customized for the

specific device upon which they will be displayed. Individual page transformations are ordered

by their desirability. In order to determine which combination of transformations should be

applied to a given document. Digestor performs a depth-first search of the document

transformation space, using many heuristics that describe preconditions for transformations and

combinations of transformations such as, Image map transform, If screen space is too limited or

the

client device cannot display images; Digestor will remove them from the document. However,

images can be used as anchors for hypertext links via a client-side image map (i.e. element

embedded within all of its ancestor's tags in the tree, the index page is constructed by copying a

section header or first sentence from each element output, concatenating them onto the index

page and creating a hypertext link from

each to the appropriate sub-page. The index page itself may need to be segmented. 'Next' and

'Previous' navigation links between sequential sub-pages are also added for

navigational convenience). If such images are removed, the web site can be rendered non-

navigable. To accommodate this, Digestor incorporates a transform that extracts the hypertext

links from such images and formats them into a text list of link anchors. The labels for the text

list are extracted from the ALT tags of the image map, if present, or from part of the URL of the

link. This transformation preserves links attached to images for navigation when removing the

images;

Also provides the CSS, a single style sheet defines a set of display attributes for different

structural portions of a document (e.g. all top-level section headings are to be displayed in red

18- point Times font). A series of style sheets may be attached to a document, each with a weight

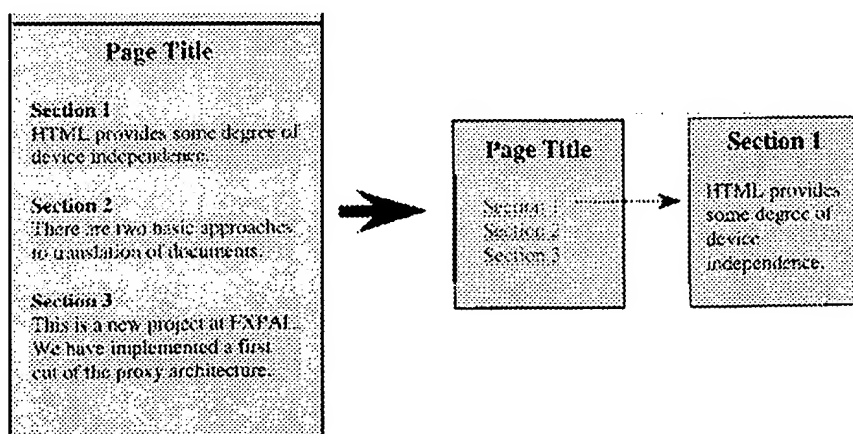describing its desirability to the document's author
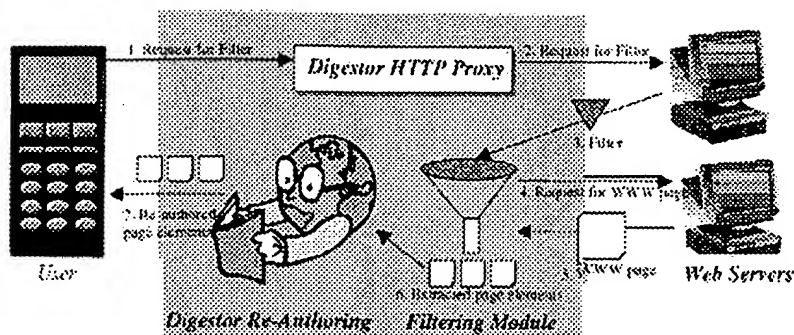
FIGURE 4. Section outlining transform.

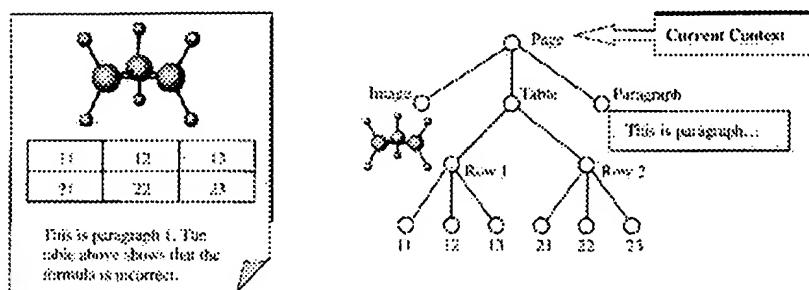FIGURE 7. Example of dataflow in the document filtering module.

FIGURE 8. Example WWW page and corresponding AST. The content context is set to root of the AST

Examiner read the above in the broadest reasonable interpretation to the claim limitation, wherein hierarchical nodes having respective weights, would have been an obvious variant of the re-authoring engine that uses heuristics to generate pages customized for the specific device upon which they will be displayed (e.g. A series of style sheets may be attached to a document, each with a weight describing its desirability) using the Depth-first search (DFS) to a person of ordinary skill in the art at the time the invention was made . As illustrated in the above Fig. 4, 7-8, a depth first search, which would have been obvious to a person of ordinary skill in the art at the time the invention was made to appreciated that Depth-first search (DFS) is an algorithm for traversing or searching a tree, tree structure, or graph. Intuitively, you start at the root (selecting some node as the root in the graph case) and explore as far as possible along each branch.

In regard to independent claim 20, incorporate substantially similar subject matter as

cited in claim 1 above, and in further view of the following, and is similarly rejected along the

same rationale,

and wherein a folder can be expanded to display information content and wherein

unexpanded folder titles are displayed along with the information content of the expanded

folder, (Bickmore at pages 534-546, "Automated re-authoring system", also see Fig. 4, 7 and 8,

discloses an automated re-authoring system that implements the re-authoring engine that uses

heuristics to generate pages customized for the specific device upon which they will be

displayed. Individual page transformations are ordered by their desirability. In order to

determine which combination of transformations should be applied to a given document.

Digestor performs a depth-first search of the document transformation space, using many

heuristics that describe preconditions for transformations and combinations of transformations

such as, Image map transform, If screen space is too limited or the

client device cannot display images, Digestor will remove them from the document. However,

images can be used as anchors for hypertext links via a client-side image map (i.e. element

embedded within all of its ancestor's tags in the tree, the index page is constructed by copying a

section header or first sentence from each element output, concatenating them onto the index

page and creating a hypertext link from each to the appropriate sub-page. The index page itself

may need to be segmented. 'Next' and 'Previous' navigation links between sequential sub-pages

are also added for navigational convenience). If such images are removed, the web site can be

rendered non-navigable. To accommodate this, Digestor incorporates a transform that extracts

the hypertext links from such images and formats them into a text list of link anchors. The labels

for the text list are extracted from the ALT tags of the image map, if present, or from part of the

URL of the link. This transformation preserves links attached to images for navigation when

removing the images;

Also provides the CSS, a single style sheet defines a set of display attributes for different

structural portions of a document (e.g. all top-level section headings are to be displayed in red

18- point Times font). A series of style sheets may be attached to a document, each with a weight

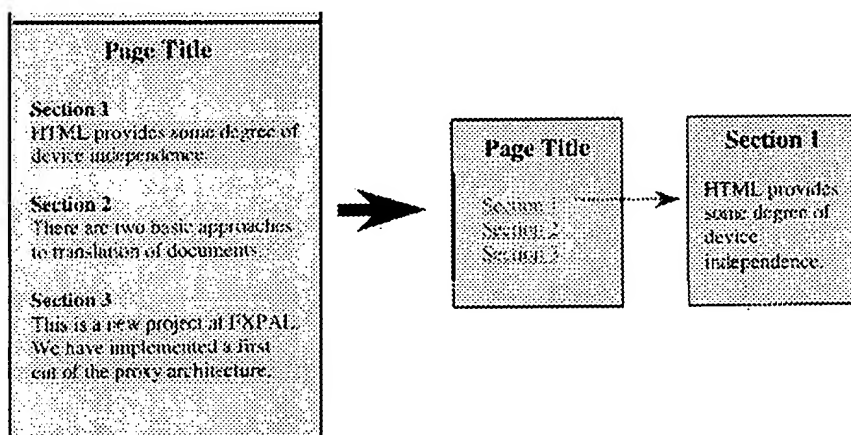describing its desirability to the document's author
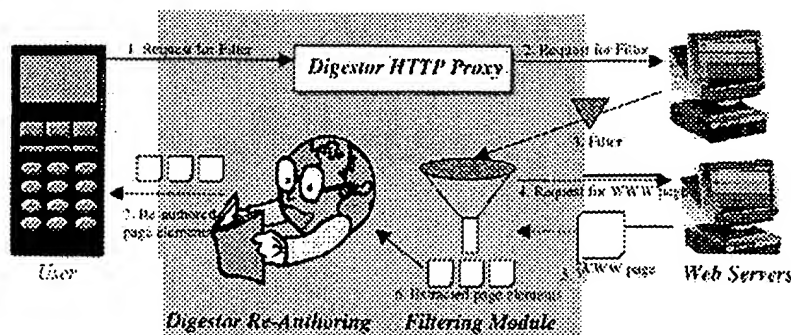
FIGURE 4. Section outlining transform

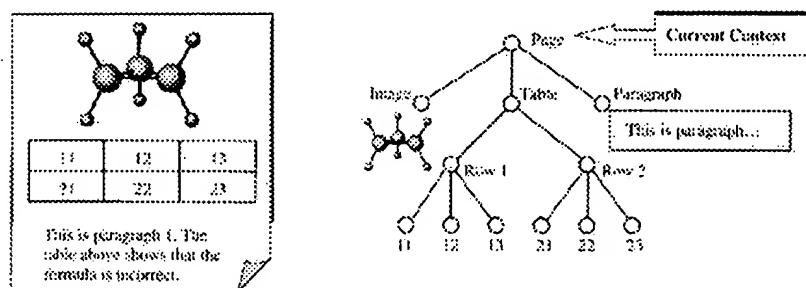FIGURE 7. Example of dataflow in the document filtering module.

FIGURE 8. Example WWW page and corresponding AST. The content context is set to root of the AST

Examiner read the above in the broadest reasonable interpretation to the claim limitation, wherein hierarchical nodes having respective weights, would have been an obvious variant of the re-authoring engine that uses heuristics to generate pages customized for the specific device upon which they will be displayed (e.g. A series of style sheets may be attached to a document, each with a weight describing its desirability) using the Depth-first search (DFS) to a person of ordinary skill in the art at the time the invention was made . As illustrated in the above Fig. 4, 7-8, a depth first search, which would have been obvious to a person of ordinary skill in the art at the time the invention was made to appreciated that Depth-first search (DFS) is an algorithm for traversing or searching a tree, tree structure, or graph. Intuitively, you start at the root (selecting some node as the root in the graph case) and explore as far as possible along each branch.

In regard to independent claim 23, directing toward a processor executing one or more

instructions for implements a computer-based method of claim 1 above, and further view of the

following, and is similarly rejected along the same rationale,

wherein the normalization markup provide at least one specific instruction for

normalizing the information content, (as taught by Bickmore at pages 534-546, also see Fig. 1,

disclosed automatic re-authoring of web documents, there is simply too much Digestor allows

users to extract only the portions of documents that they are interested in, via a simple, end-user

scripting language that combines structural page navigation commands with regular expression

pattern matching and report generation functions.

In regard to independent claim 27, incorporate substantially similar subject matter as

cited in claims 1, 16 and 23 above, and is similarly rejected along the same rationale.

In regard to independent claim 31, directing toward a processor executing one or more

instructions for implements a computer-based method of claim 1, 16 and 23 above, and further

view of the following, and is similarly rejected along the same rationale,

wherein the plurality of arrays utilize re-usable buffers, and wherein the stored

information describes the document object tree and tree dependencies as a mutable object,

(as taught by Bickmore at pages 534-546, also see Fig. 1, further discloses the Java in

collaborating with hash tables to represent attribute-value pairs attached to each node in the parse

tree. whenever a parse tree was copied during a transform. Representing attribute-value pairs as

object arrays that were searched linearly increased the performance significantly. Vectors

provided a convenient means for representing the children of a node in the parse tree that

supported the addition and deletion of children,

wherein separate arrays are used to store values representing properties of each

node including properties selected from the group consisting of a parent node a previous

sibling node and a next sibling node, and a first child node (as taught by Bickmore at pages

534-546, also see Fig. 1, further discloses the Java in collaborating with hash tables to represent

attribute-value pairs attached to each node in the parse tree. whenever a parse tree was copied

during a transform. Representing attribute-value pairs as object arrays that were searched linearly

increased the performance significantly. Vectors provided a convenient means for representing

the children of a node in the parse tree that supported the addition and deletion of children.

wherein the plurality of arrays contain values associated with the nodes of the data,

and wherein operations on the nodes can be carried out by utilizing the value as referenced

to the affected nodes, (see Bickmore at pages 534-546, "Automated re-authoring system", also

see Fig. 4, 7 and 8) discloses an automated re-authoring system that implements the re-authoring

engine that uses heuristics (weight) to generate pages customized (insert) for the specific device

upon which they will be displayed. In order to determine which combination of transformations

should be applied to a given document. Digestor performs a depth-first search of the document

transformation space, using many heuristics that describe preconditions for transformations and

combinations of transformations such as, Image map transform. The index page itself may need

to be segmented. 'Next' and 'Previous' navigation links between sequential sub-pages are also

added for navigational convenience). If such images are removed, the web site can be rendered

non-navigable. To accommodate this, Digestor incorporates a transform that extracts the

hypertext links from such images and formats them into a text list of link anchors. The labels for

the text list are extracted from the ALT tags of the image map, if present, or from part of the

URL of the link. This transformation preserves links attached to images for navigation when

removing the images; also provides the CSS, a single style sheet defines a set of display

attributes for different structural portions of a document (e.g. all top-level section headings are to

be displayed in red 18- point Times font). A series of style sheets may be attached to a document,

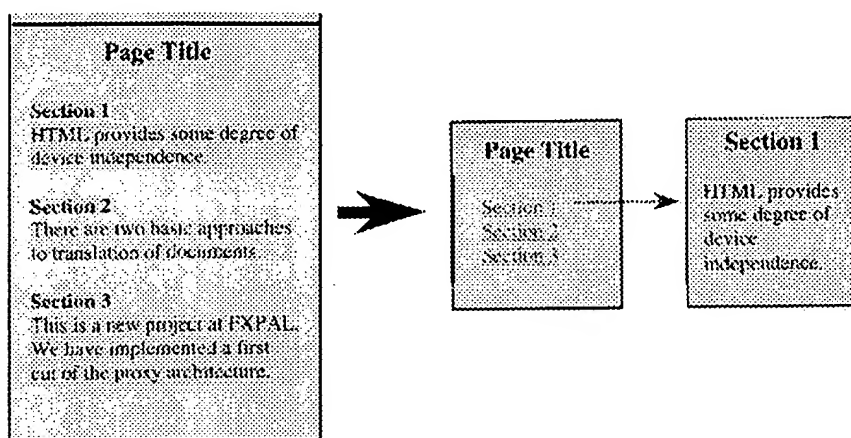each with a weight describing its desirability to the document's author

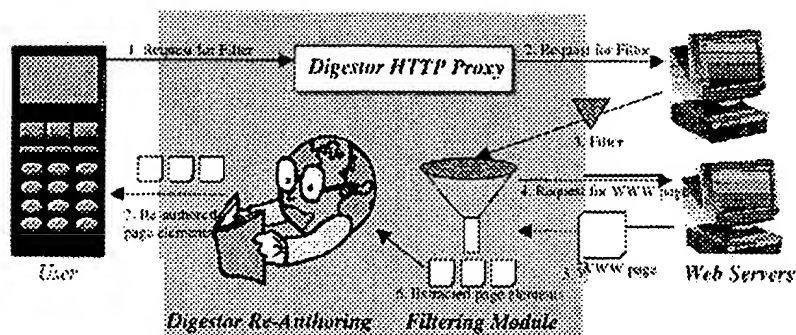FIGURE 4. Section outlining transform.

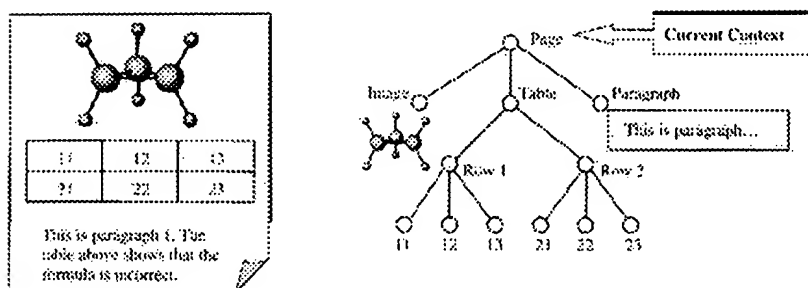FIGURE 7. Example of dataflow in the document filtering module.

FIGURE 8. Example WWW page and corresponding AST. The current context is set to root of the AST

also the Java in collaborating with hash tables in Fig. 8 above to represent attribute-value pairs

attached to each node in the parse tree, whenever a parse tree was copied during a transform.

Representing attribute-value pairs as object arrays that were searched linearly increased the

performance significantly. Vectors provided a convenient means for representing the children of

a node in the parse tree that supported the addition and deletion of children.

In regard to independent claim 39, directing toward a processor executing one or more

instructions for implements a computer-based method of claims 1, 16 and 23 above, and is

similarly rejected along the same rationale.

In regard to dependent claims 2-15, 17-19, 21-22, 25-26, and 41-42 incorporate

substantially similar subject matter as cited in claims 1, 16, 23 and 39 above, and are similarly

rejected along the same rationale.

In regard to dependent claim 43 incorporate substantially similar subject matter as cited in claims 1-16 and 20 above, and is similarly rejected along the same rationale.

In regard to dependent claim 24 incorporate substantially similar subject matter as cited in claims 27 and 16 above, and is similarly rejected along the same rationale.

In regard to dependent claim 28 incorporate substantially similar subject matter as cited in claims 1, 16, 23 and 39 above, and further view of the following and are similarly rejected along the same rationale,

weighting node in a table and attempt to match the table to a predefined pattern of weights..., however (Hirose at col. 12 lines 5-55, i.e. FIG. 12 is a diagram showing an example of contents of information about attributes of the terminal).

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to have modified the teaching of Bickmore, discloses a template normalizer for matching and applying a template to the information content, wherein the template defines modifications to the document in order to adapt the document for display on a device other than an originally intended device an automatic normalizer for folderizing the information content, wherein the a template normalizer attempts to match a template to the information content, and if not the automatic normalizer for folderizing the information content to produce a normalized information content, wherein the information content is organized into a set of hierarchical nodes having respective weights, to include a means of weighting node in a table and attempt to match the table to a predefined pattern of weights of Hirose's teaching. One of ordinary skill in the art would have been motivated to perform such a modification to provides an automatic re-authoring of web documents to make them automatically converts web-based documents designed for

desktop viewing into formats appropriate for handheld devices with small display screens, such

as Palm-PCs, PDAs, and cellular phones (as taught by Bickmore at page 534).

In regard to dependent claims 29 and 40 incorporate substantially similar subject

matter as cited in claims 1, 16, 20, 23, 27, 28, 31 and 39 above, and are similarly rejected along

the same rationale.

In regard to dependent claim 30 incorporate substantially similar subject matter as cited

in claims 1, 16, 20, 23, 27, 28, 31 and 39 above, and are similarly rejected along the same

rationale.

In regard to dependent claim 32 incorporate substantially similar subject matter as cited

in claims 27 and 39 above, and are similarly rejected along the same rationale.

In regard to dependent claims 33-35 and 37-38 incorporate substantially similar

subject matter as cited in claims 27, 31 and 39 above, and are similarly rejected along the same

rationale.

Response to Arguments

6.   Applicant's arguments filed 05/15/2006 have been fully considered but they are not

persuasive. The reason is set forth in the current Office Action cited above and further view of

the following:

It is noted that the Applicant Remarks, includes claim 36 (current status is canceled – see

Amendments To The Claims page 36 and the Remarks page 13).

Brief description of cited prior arts:

Bickmore (see Bickmore at pages 534-546, "Automated re-authoring system", also see Fig. 4, 7

and 8) discloses automatically converts web-based documents designed for desktop viewing into

formats appropriate for handheld devices with small display screens, such as Palm-PCs, PDAs,

and cellular phones, wherein single style sheet defines a set of display attributes for different

structural portions of a document,

The Digestor includes,

- a heuristic planning algorithm and

- a set of structural page transformations to produce the 'best' looking document for a

given display size.

Digestor can also be instructed, via a scripting language, to render portions of documents,

thereby avoiding navigation through many screens of information. Two versions of Digestor

have been deployed,

- one that reauthors HTML into HTML for conventional browsers and

- one that converts HTML into HDML for Phone.com's micro-browsers. Digestor

provides a crucial technology for rapidly accessing, scanning and processing information from

arbitrary web-based documents from any location reachable by wired or unwired

communication.

Hirose discloses a method for generating display control information (HTML document, for

instance) so as to display in a form adapted to a terminal used by a user, such as a group of data

objects (tree structure view objects, includes priorities to weather or not splitting and/or outlining

is possible, also includes attributes of the terminal includes the screen size of the terminal,

communication speed, aspect ratio, and number of colors and may be in any other markup

language – see Hirose at col. 3, lines 50-67) are generated independently of any terminal (the

terminals are equipments such as ordinary PCs, PDAs, TV sets and cellular phones on which a

browser is available - see Hirose at col. 3, lines 20-40).

Response to Arguments:

Beginning on page 13 of the Remarks (hereinafter the remarks), Applicant argues the

following issues, which are accordingly addressed below.

Applicant's arguments, on pages 14-21 of the remarks that the references in combination,

do not teach:

(i) where a weight determines whether a node will be inserted into a normalized

document as a folder title or folder contents,

(ii) identifying content having a higher visibly on a display of the originally intended

device, assigning the content having the higher visibility a weight indicative of a folder title,

(iii) folderizing content;

(iv) wherein if the node has no effect on a visual display of the information content

and the node is not folder content, the node removed;

(v) wherein a folder can be expanded to display information content, and wherein

unexpanded folder titles are displayed along with the information content of the expanded

foldery;

(vi) utilizing normalization markup in the information content to normalize the

information content, wherein the normalization markup provide at least one specific

instruction for normalizing the information content;

(vii) weighting nodes in the document tree according to the determined criteria,

wherein content having a higher visibility on a display are assigned a weight indicative of a

folder title;

(viii) wherein the plurality of arrays contain values associated with the nodes of the

data, and wherein operations on the nodes can be carried out by utilizing the value as

referenced to the affected nodes;

(viiii) applying changes to the document tree according to the template markup

language, wherein the template markup language provides at least one specific instruction

for normalizing the information content;

The examiner respectfully disagrees. As for **(i)** The examiner respectfully notes that,

Hirose discloses a method for generating display control information (HTML document, for

instance) so as to display in a form adapted to a terminal used by a user, such as a group of data

objects (tree structure view objects, includes priorities to weather or not splitting and/or outlining

is possible, also includes attributes of the terminal includes the screen size of the terminal,

communication speed, aspect ratio, and number of colors and may be in any other markup

language – see Hirose at col. 3, lines 50-67) are generated independently of any terminal (the

terminals are equipments such as ordinary PCs, PDAs, TV sets and cellular phones on which a

browser is available - see Hirose at col. 3, lines 20-40) in combination with, **Bickmore** (see

Bickmore at pages 534-546, "Automated re-authoring system", also see Fig. 4, 7 and 8) discloses an automated re-authoring system that implements the re-authoring engine that uses **heuristics (weight) to generate pages customized (insert) for the specific device upon which they will be displayed**. In order to determine which combination of transformations should be applied to a given document. Digestor performs a depth-first search of the document transformation space, **using many heuristics that describe preconditions for transformations and combinations of transformations such as, Image map transform.** The index page itself may need to be segmented. 'Next' and 'Previous' navigation links between sequential sub-pages are also added for navigational convenience). If such images are removed, the web site can be rendered non-navigable. To accommodate this, Digestor incorporates a transform that extracts the hypertext links from such images and formats them into a text list of link anchors. The labels for the text list are extracted from the ALT tags of the image map, if present, or from part of the URL of the link. This transformation preserves links attached to images for navigation when removing the images; also provides the CSS, a single style sheet defines a set of display attributes for different structural portions of a document (e.g. all top-level section headings are to be displayed in red 18- point Times font). A series of style sheets may be attached to a document, **each with a weight describing its desirability to the document's author**
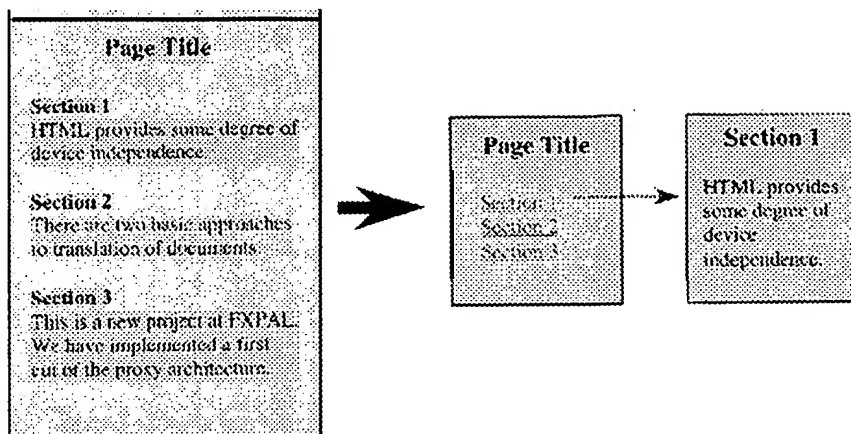
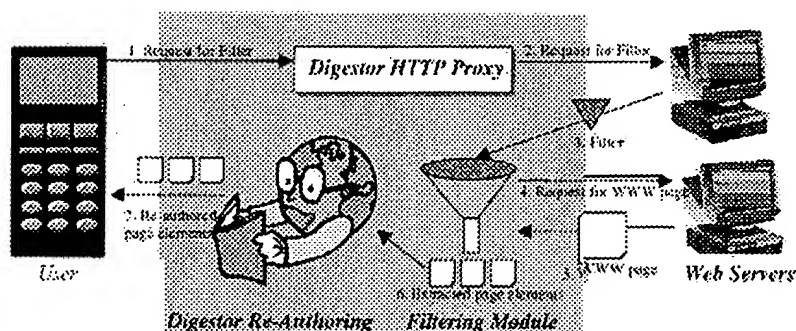FIGURE 4. Section outlining transform.

FIGURE 7. Example of dataflow in the document filtering module.
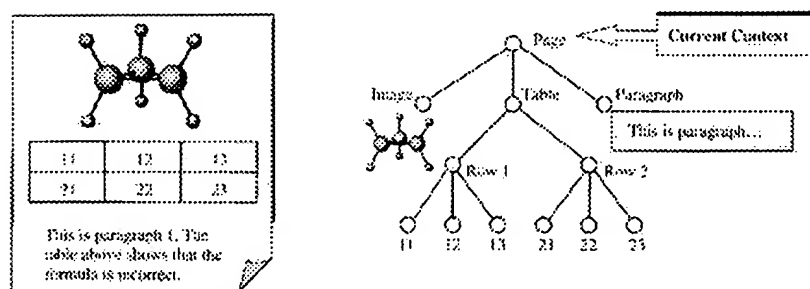

FIGURE 8. Example WWW page and corresponding AST. The current context is set to root of the AST

also the Java in <u>collaborating with hash tables in Fig. 8 above to represent **attribute-value pairs**</u>

<u>attached to each node in the parse tree.</u> whenever a parse tree was copied during a transform.

Representing attribute-value pairs as **object arrays** that were searched linearly increased the

performance significantly. **Vectors provided a convenient means for representing the**

children of a node in the parse tree that supported the addition and deletion of children,

Thus can reasonably interprets as argues in **(i).**

As for **(ii)** The examiner respectfully notes that, **Hirose** discloses a method for generating

display control information (HTML document, for instance) so as to display in a form adapted to

a terminal used by a user, such as a group of data objects (tree structure view objects, includes

priorities to weather or not splitting and/or outlining is possible, also includes attributes of the

terminal includes the screen size of the terminal, communication speed, aspect ratio, and number

of colors and may be in any other markup language – see Hirose at col. 3, lines 50-67) are

generated independently of any terminal (the terminals are equipments such as ordinary PCs,

PDAs, TV sets and cellular phones on which a browser is available - see Hirose at col. 3, lines

20-40) in combination with, **Bickmore** (see Bickmore at pages 534-546, "Automated re-

authoring system", also see Fig. 4, 7 and 8) discloses an automated re-authoring system that

implements the re-authoring engine that uses **heuristics (weight) to generate pages customized**

(insert) for the specific device upon which they will be displayed. In order to determine which

combination of transformations should be applied to a given document. Digestor performs a

depth-first search of the document transformation space, **using many heuristics that describe**

preconditions for transformations and combinations of transformations such as, Image map

transform. The index page itself may need to be segmented. 'Next' and 'Previous' navigation

links between sequential sub-pages are also added for navigational convenience). If such images

are removed, the web site can be rendered non-navigable. To accommodate this, Digestor

incorporates a transform that extracts the hypertext links from such images and formats them into

a text list of link anchors. The labels for the text list are extracted from the ALT tags of the

image map, if present, or from part of the URL of the link. This transformation preserves links

attached to images for navigation when removing the images; also provides the CSS, a single

style sheet defines a set of display attributes for different structural portions of a document (e.g.

all top-level section headings are to be displayed in red 18- point Times font). A series of style

sheets may be attached to a document, <u>each with **a weight describing its desirability to the**</u>
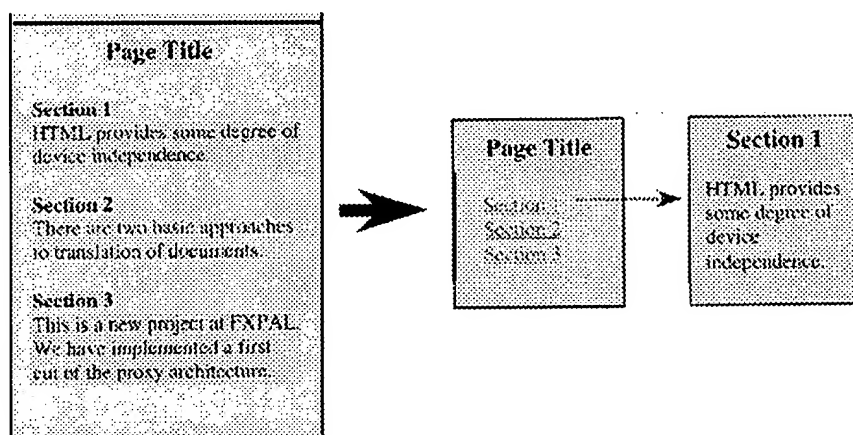
document's author

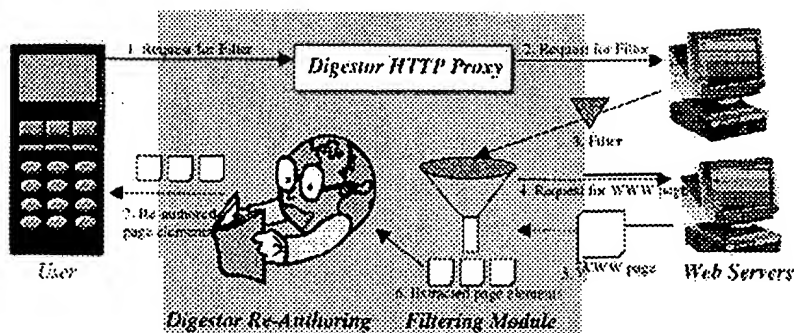FIGURE 4. Section outlining transform.

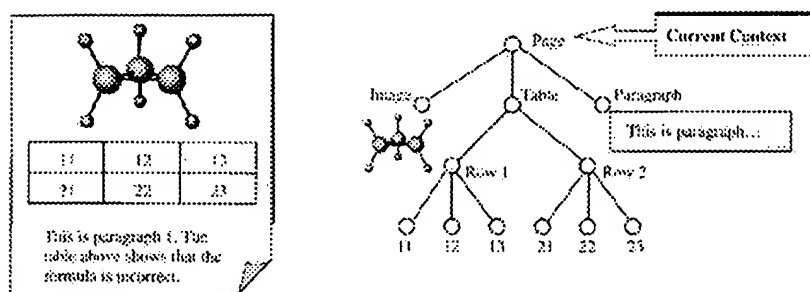FIGURE 7. Example of dataflow in the document filtering module.

FIGURE 8. Example WWW page and corresponding AST. The current context is set to root of the AST

also the Java in <u>collaborating with hash tables in Fig. 8 above to represent</u> **attribute-value pairs**

attached to each node in the parse tree; whenever a parse tree was copied during a transform.

Representing attribute-value pairs as **object arrays** that were searched linearly increased the

performance significantly. **Vectors provided a convenient means for representing the**

children of a node in the parse tree that supported the addition and deletion of children,

Thus can reasonably interprets as argues in **(ii).**

As for **(iii)** The examiner respectfully notes that, **Bickmore's** "Automated re-authoring

system," determine which combination of transformations should be applied to a given

document. Digestor performs a depth-first search of the document transformation space, using

many **heuristics** that describe preconditions for transformations and combinations of

transformations such as, Image map transform. The **index page** itself **may need to be segmented.**

'Next' and 'Previous' navigation links between sequential **sub-pages** are also added for

navigational convenience (see Bickmore at pages 534-546, "Automated re-authoring system",

also see Fig. 4, 7 and 8). It is noted that Bickmore's **indexing page** segmented into navigation

links between sequential **sub-pages**, thus can reasonably interprets as "folderizing content,"

of **(iii)** above.

As for **(iv)** The examiner respectfully notes that, **Bickmore**'s "Automated re-authoring

system," determine which combination of transformations should be applied to a given document

using **Vectors provided a convenient means for representing the children of a node in the**

parse tree that supported the addition and deletion of children (see Bickmore at pages 534-546,

"Automated re-authoring system", also see Fig. 4, 7 and 8). It is noted that Bickmore's **Vectors**

provided a convenient means for representing the children of a node in the parse tree that

supported the addition and deletion of children, can reasonably interprets as argues in **(iv)**.

As for **(v)** The examiner respectfully notes that, he examiner respectfully notes that,

Bickmore's "Automated re-authoring system," using many **heuristics that describe**

preconditions for transformations and combinations of transformations such as, Image map

transform. The index page itself may need to be segmented. 'Next' and 'Previous' navigation

links between sequential sub-pages are also added for navigational convenience). If such images

are removed, the web site can be rendered non-navigable. To accommodate this, Digestor

incorporates a transform that extracts the hypertext links from such images and formats them into

a text list of link anchors. The labels for the text list are extracted from the ALT tags of the

image map, if present, or from part of the URL of the link. This transformation preserves links

attached to images for navigation when removing the images; also provides the CSS, a single

style sheet defines a set of display attributes for different structural portions of a document (e.g.

all top-level section headings are to be displayed in red 18- point Times font) –(see Bickmore at

pages 534-546, "Automated re-authoring system", also see Fig. 4, 7 and 8). It is noted that

Bickmore's "Automated re-authoring system," that supported the addition and deletion of

children and if such images are removed, the web site can be rendered non-navigable. To

accommodate this, Digestor incorporates a transform that extracts the hypertext links from such

images and formats them into a text list of link anchors, can reasonably interprets as

argues in **(v).**

As for **(vi)** The examiner respectfully notes that, **Bickmore** discloses automatically

converts web-based documents designed for desktop viewing into formats appropriate for

handheld devices with small display screens, such as Palm-PCs, PDAs, and cellular phones,

wherein single style sheet defines a set of display attributes for different structural portions of a

document, The Digestor includes,

- a heuristic planning algorithm and

- a set of structural page transformations to produce the 'best' looking document for a

given display size.

Digestor can also be instructed, via a scripting language, to render portions of documents,

thereby avoiding navigation through many screens of information. Two versions of Digestor

have been deployed,

- one that reauthors HTML into HTML for conventional browsers and

- one that converts HTML into HDML for Phone.com's micro-browsers. Digestor

provides a crucial technology for rapidly accessing, scanning and processing information from

arbitrary web-based documents from any location reachable by wired or unwired

communication.

It is noted that **Bickmore**'s Digestor can also be instructed, via a scripting language, to

render portions of documents, thereby avoiding navigation through many screens of information.

Two versions of Digestor have been deployed, (i.e. that reauthors HTML into HTML for

conventional browsers and/or converts HTML into HDML for Phone.com's micro-browsers, can

reasonably interprets as argues in **(vi)**.

As for **(vii)** and **(viiii)** The examiner respectfully notes that, **Bickmore**'s "Automated re-

authoring system" in <u>collaborating of java with hash tables in Fig. 8 above to represent</u>

<u>**attribute-value pairs attached to each node in the parse tree,**</u> whenever a parse tree was

copied during a transform. Representing attribute-value pairs as <u>**object arrays**</u> that were

searched linearly increased the performance significantly. <u>**Vectors provided a convenient**</u>

<u>**means for representing the children of a node in the parse tree**</u> that supported the addition

and deletion of children (see Bickmore at pages 534-546, "Automated re-authoring system", also

see Fig. 4, 7 and 8). It is noted that Bickmore's objects view tree, can reasonably interprets as

argues in **(vii)**.

As for **(viii)**, The examiner respectfully notes that, **Hirose** discloses a method for

generating display control information (HTML document, for instance) so as to display in a form

adapted to a terminal used by a user, such as a group of data objects (tree structure view objects,

includes priorities to weather or not splitting and/or outlining is possible, also includes attributes

of the terminal includes the screen size of the terminal, communication speed, aspect ratio, and

number of colors and may be in any other markup language – see Hirose at col. 3, lines 50-67)

are generated independently of any terminal (the terminals are equipments such as ordinary PCs,

PDAs, TV sets and cellular phones on which a browser is available - see Hirose at col. 3, lines

20-40) in combination with, **Bickmore** (see Bickmore at pages 534-546, "Automated re-

authoring system", also see Fig. 4, 7 and 8, discloses an automated re-authoring system that

implements the re-authoring engine that uses **heuristics (weight) to generate pages customized**

(insert) for the specific device upon which they will be displayed. In order to determine which

combination of transformations should be applied to a given document. Digestor performs a

depth-first search of the document transformation space, **using many heuristics that describe**

preconditions for transformations and combinations of transformations such as, Image map

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are removed, the web site can be rendered non-navigable. To accommodate this, Digestor

incorporates a transform that extracts the hypertext links from such images and formats them into

a text list of link anchors. The labels for the text list are extracted from the ALT tags of the

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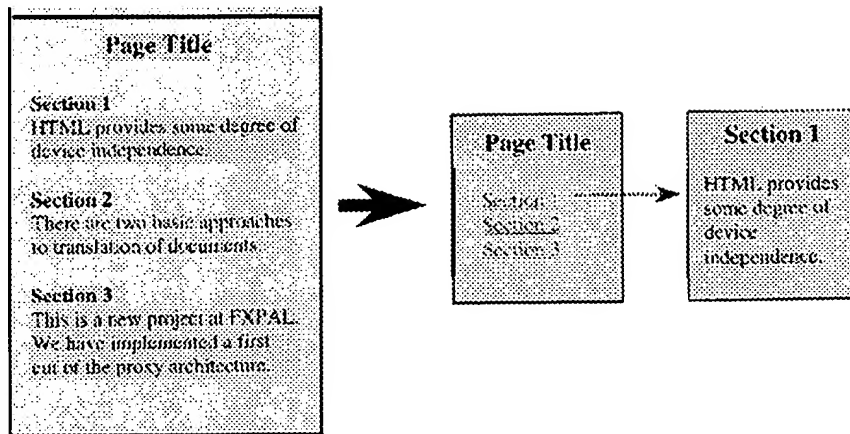
document's author
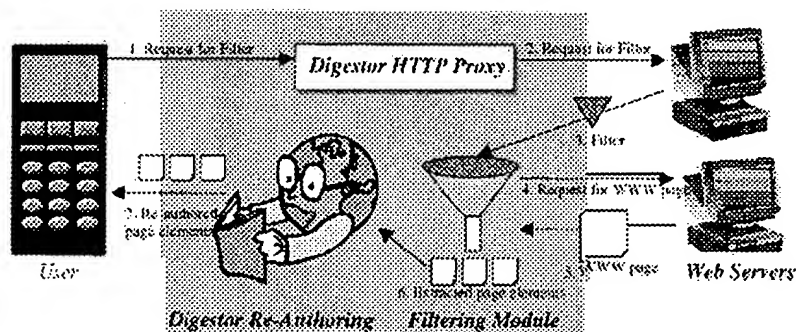
FIGURE 4. Section outlining transform.

FIGURE 7. Example of dataflow in the document filtering module.
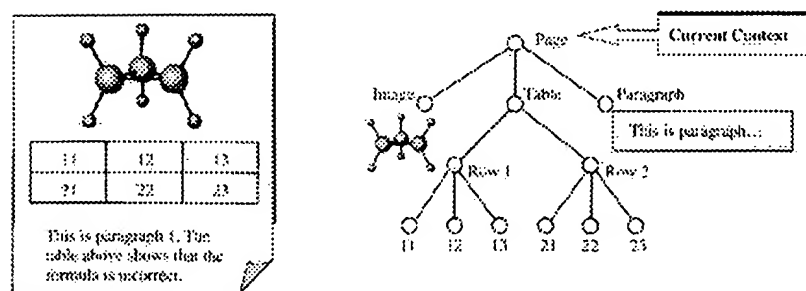

FIGURE 8. Example WWW page and corresponding AST. The current context is set to root of the AST

also the Java in <u>collaborating with hash tables in Fig. 8 above to represent **attribute-value pairs**</u>

<u>attached to each node in the parse tree,</u> whenever a parse tree was copied during a transform.

Representing attribute-value pairs as **object arrays** that were searched linearly increased the

performance significantly. **Vectors provided a convenient means for representing the**

children of a node in the parse tree that supported the addition and deletion of children,

It is noted Bickmore's Representing attribute-value pairs as **object arrays and Vectors**

provided a convenient means for representing the children of a node in the parse tree, can

reasonably interprets as argues in **(viii).**

Thus a prima facie case has been established and therefore the Examiner respectfully

maintains the rejection of independent claims 1, 16, 20, 23, 27, 31 and 39 and their dependencies

for at least the reason cited above at this time.

Conclusion

7.   *THIS ACTION IS MADE FINAL.* Applicant is reminded of the extension of time

policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE

MONTHS from the mailing date of this action. In the event a first reply is filed within TWO

MONTHS of the mailing date of this final action and the advisory action is not mailed until after

the end of the THREE-MONTH shortened statutory period, then the shortened statutory period

will expire on the date the advisory action is mailed, and any extension fee pursuant to 37

CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event,

however, will the statutory period for reply expire later than SIX MONTHS from the mailing

date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Quoc A. Tran whose telephone number is (571) 272-4103. The examiner can normally be reached on Monday through Friday from 8 AM to 4:30 PM EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Herndon R. Heather can be reached on (571) -272-4136. The fax phone number for the organization where this application or proceeding is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Quoc A, Tran
Patent Examiner
Technology Center 2176
August 5, 2006

WILLIAM BASHORE
PRIMARY EXAMINER